Abstracts

World Real Interest Rates
ROBERT J. BARRO AND XAVIER SALA-I-MARTIN

We think of the expected real interest rate for ten OECD countries (our counterpart of the world economy) as determined by the equation of aggregate investment demand to aggregate desired saving. Stock-market returns isolate shifts to investment demand, and changes in oil prices, monetary growth, and fiscal variables isolate shifts to desired saving. In this paper, we estimated the reduced form for GDP-weighted world averages of the expected short-term real interest rate and the investment ratio over the period 1959–88. The estimates reveal significant effects in the predicted direction for world stock returns, oil prices, and world monetary growth, but fiscal variables turned out to be unimportant. Structural estimation implies that an increase by 1% in the expected real interest rates raises the desired saving rate by one-third of a percentage point. Simulations of the model indicate that fluctuations in world stock returns and oil prices explain a good deal of the time series for the world average of expected real interest rates, specifically, why the rates were low in 1974–79 and high in 1981–86. The model also explains the fall in real rates in 1987–88 and the subsequent upturn in 1989. The fitted relation forecasts an increase in the world average of real interest rates in 1990 to a value, 5.6%, that is nearly a full percentage point above the highest value attained in the entire prior sample, 1958–89. We estimated systems of equations for individual countries’ expected real interest rates and investment ratios. One finding is that each country’s expected real interest rate depends primarily on world factors, rather than own-country factors, thereby suggesting a good deal of integration of world capital and goods markets.

Can Severe Fiscal Contractions Be Expansionary? Tales of Two Small European Countries
FRANCESCO GIAVAZZI AND MARCO PAGANO

According to conventional wisdom, a fiscal consolidation is likely to contract real aggregate demand. It has often been argued, however, that this conclusion is
misleading as it neglects the role of expectations of future policy; if the fiscal consolidation is read by the private sector as a signal that the share of government spending in GDP is being permanently reduced, households will revise upward the estimate of their permanent income, and will raise current and planned consumption.

Only the empirical evidence can sort out which of these two contending views about fiscal policy is more appropriate—i.e., how often the contractionary effect of a fiscal consolidation prevails on its expansionary expectational effect. This paper brings new evidence to bear on this issue drawing on the European exercise in fiscal rectitude of the 1980s, and focusing, in particular, on its two most extreme cases—Denmark and Ireland.

We find that at least in the experience of these two countries the expectations view has a serious claim to empirical relevance.

**Gross Job Creation and Destruction: Microeconomic Evidence and Macroeconomic Implications**

STEVEN J. DAVIS AND JOHN HALTIWANGER

This paper investigates the connection between the heterogeneity of establishment-level employment changes and aggregate fluctuations at business cycle frequencies. Our empirical work exploits a rich data set with approximately 860,000 annual observations and 3.4 million quarterly observations on 160,000 manufacturing establishments to calculate rates of gross job creation, gross job destruction, and their sum, gross job reallocation. Three central messages emerge from the research in this paper: First, establishment-level employment changes exhibit tremendous heterogeneity, even within narrowly defined sectors of the economy. This heterogeneity manifests itself in terms of high rates of gross job creation, destruction, and reallocation. Furthermore, the magnitude of this heterogeneity varies significantly over time; most of the variation is due to time variation in the idiosyncratic component of establishment growth rates, and the variation is significantly countercyclical. Second, our theoretical model of employment reallocation and business cycles is suggestive of how both aggregate and allocative disturbances can drive fluctuations in job creation, job destruction, unemployment, productivity, and output. Third, our empirical analysis of the joint dynamics of job creation and destruction supports the view that allocative disturbances were a major driving force behind movements in job creation, job destruction, job reallocation, and net employment growth in the U.S. manufacturing sector during the 1972 to 1986 period.

**Wage and Employment Patterns in Long-Term Contracts When Labor Is Quasi-Fixed**

MARK BILS

This paper presents evidence on predictable patterns that occur in wages and employment within the duration of labor contracts in U.S. manufacturing. Wage
rates are very predictably front-loaded—wage growth is concentrated at the beginning of contracts. More surprisingly, employment, on average, grows fastest in the first year of contracts.

Results of contracting in the presence of dynamic labor demand are derived. I find that wages should predictably decline during contracts because unions use long-term contracts to commit to lower wage rates in future periods in order to increase employment demand today. Employment predictably increased during contracts; but these increases are small both because of the costs of adjusting employment and because firms have incentive to reduce employment at the end of contracts to reduce wage rates in subsequent bargains.

I test further implications of the model against cross-sectional patterns in wage and employment behavior during contracts.

Kinked Adjustment Costs and Aggregate Dynamics
GIUSEPPE BERTOLA AND RICARDO J. CABALLERO

Because adjustment costs may make infrequent corrections preferable to partial continuous adjustment, microeconomic units often behave quite differently from representative agents in aggregate dynamic models. Idiosyncratic uncertainty precludes perfect coordination of microeconomic adjustment and explains the much smoother behavior of aggregate variables. This paper reviews and extends models of optimal adjustment under uncertainty and of dynamic aggregation, and argues that unsynchronized microeconomic adjustment can provide a sensible, structural interpretation of macroeconomic time series. A simple statistical representation of the process followed by aggregate variables in the presence of microeconomic adjustment costs and of idiosyncratic uncertainty is shown to satisfactorily explain the behavior of U.S. durable consumption data.

Macroeconomic Issues of Soviet Reforms
GUR OFER

The Soviet Union entered the era of economic reform with very little economic reserves, and large deficiencies of both economic and social infrastructures. Early and partial decentralization reforms toward a market system failed to produce supply responses; instead, through monetary and credit expansion and a rise in wages it greatly increased the state of disequilibrium, especially in consumer markets. “Soft budget constraints” and lack of financial infrastructure added to the problems.

Since 1985 also the size of the state budget deficit has expanded substantially and reached more than 10% of GNP by 1989. This was the outcome of pressures to raise expenditures, including rapid rise in subsidies, inadequate tax system, the temporary nature of some major revenue sources, and the lack of appreciation of the importance of a balanced budget.

The state of disequilibrium blocks the option for an orderly reform, or at least creates the need for a stabilization program before or together with the reform.
This paper rejects the option of a “big bang” approach, since the Soviet Union hasn’t yet developed runaway inflation, and since the resulting open inflation is a difficult environment for a serious reform. Instead, this paper advocates a reform consisting of a one-time major change in the level and structure of prices accompanied by the elimination of subsidies; and the additional absorption of the “monetary overhang” by the sale to the public (or long leasing) of housing, land, and enterprises under a program of a credible reform in the structure of property rights.